

TARIFFIC COMMISSION  
GOVERNMENT OF INDIA

# REPORT

THE CONTINUANCE OF  
PROTECTION TO THE

**GLUCOSE  
INDUSTRY**



**BOMBAY**  
**1953**



सत्यमेव जयते

**REPORT**  
OF THE  
**TARIFF COMMISSION**  
ON THE CONTINUANCE OF PROTECTION TO THE  
**GLUCOSE INDUSTRY**

सत्यमेव जयते

BOMBAY  
1953



सत्यमेव जयते

**REPORT**  
OF THE  
**TARIFF COMMISSION**  
ON THE CONTINUANCE OF PROTECTION TO THE  
**GLUCOSE INDUSTRY**

सत्यमेव जयते

BOMBAY  
1953

## CONTENTS

Para.		Page
1.	Origin of the case ... ..	1
2.	Method of inquiry ... ..	2
3.	Scope of the inquiry ... ..	3
4.	Present position of the industry ... ..	4
5.	Domestic Demand ... ..	6
6.	Production ... ..	7
7.	Raw Materials ... ..	7
8.	Quality of the indigenous product ... ..	13
9.	Imports ... ..	15
10.	Fair ex-works price of glucose ... ..	15
11.	Existing rates of duty ... ..	18
12.	C.i.f. price and landed cost ... ..	19
13.	Comparison of fair ex-works price with the landed cost ... ..	19
14.	Measure of protection ... ..	20
15.	Summary of conclusions and recommendations	23
16.	Acknowledgements ... ..	24

## APPENDICES

I.	List of persons or bodies to whom the Commission's questionnaires were issued and from whom replies or memoranda were received. ... ..	27
II.	List of persons who attended the Commission's public inquiry and gave evidence. ... ..	31
III.	Statement showing the break-down of the landed costs of liquid glucose into c.i.f., customs duty and clearing charges. ... ..	33

## PERSONNEL OF THE COMMISSION

Shri M. D. Bhat	....	....	<i>Chairman</i>
Dr. B.V. Narayanaswamy Naidu, M.A., B.Com., Ph.D., Bar-at-Law			<i>Member</i>
Shri B. N. Adarkar, M.A. (Cantab.)	....		<i>Member</i>
Shri B.N. Das Gupta, B.A., A.S.A.A. (London), F.C.A.	....		<i>Member</i>
Shri C. Ramasubban	....	....	<i>Member</i>
Dr. D.K. Malhotra, M.A., Ph.D.	....	....	<i>Secretary</i>

## PERSONNEL OF THE PANEL WHICH HEARD THE CASE

Dr. B.V. Narayanaswamy Naidu	....	<i>Member</i>
Shri B.N. Adarkar	....	<i>Member</i>
Shri B.N. Das Gupta	....	<i>Member</i>




- (5) The Development Wing of the Ministry of Commerce & Industry should carry out periodical tests of the quality of indigenous glucose.

2. Government accept all the recommendations of the Tariff Commission and will take steps to implement them as far as possible.

3. The attention of the Industry is invited to recommendations Nos. (2), (3) & (4).

4. Government, however, note with concern the fact that the production of glucose in the country has been declining during the last three years. They hope that the measures now adopted by Government on the Tariff Commission's recommendations will result in a substantial increase in the industry's output over the next 18 months. Unless this happens and unless Government are satisfied at the end of the present period of protection that the industry has made good use of the opportunity for development and expansion now afforded to it, it may not be possible for Government to continue to give any kind of protection to this industry.

  
L.K. Jha,  
*Joint Secretary to the Government of India.*

GOVERNMENT OF INDIA  
MINISTRY OF COMMERCE & INDUSTRY

NOTIFICATION  
(Tariffs)

New Delhi, the 27th June, 1953.,

No. 12(2)-T.B./53.- In exercise of the powers conferred by subsection (1) of Section 4 of the Indian Tariff Act, 1934 (XXXII of 1934), the Central Government hereby increases the Protective duty leviable under item 21(3) of the First Schedule to the said Act on Glucose other than glucose prepared for medicinal purposes from 30 per cent. *ad valorem* to 50 per cent. *ad valorem*.

L.K. Jha,  
Joint Secretary to the Government of India.,

GOVERNMENT OF INDIA  
MINISTRY OF COMMERCE & INDUSTRY

RESOLUTION  
(Tariffs)

New Delhi, the 27th June, 1953.

No. 12(2)-T.B./53.- The Tariff Commission has submitted its Report on the continuance of protection to the Glucose Industry on the basis of an enquiry undertaken by it under Section 11(e) read with Sections 13 and 15 of the Tariff Commission Act, 1951. Its recommendations are as follows:-

- (1) The rate of protective duty on non-medical Glucose should be increased from the present level of 31½ per cent. *ad valorem* (inclusive of surcharge) to 50 per cent. *ad valorem* (inclusive of surcharge) and the enhanced rate should remain in force until 31st December, 1954.
- (2) The present arrangement under which the indigenous starch industry is allowed to utilise a portion of its starch production for the manufacture of glucose should be terminated and those starch factories which have glucose plants should be given separate quotas for imports of maize exclusively for the manufacture of glucose. The manufacturers should experiment with tapioca as an alternative raw material and should from time to time report to the Commission the progress made by them in this direction.
- (3) Glucose and Foods Ltd., Bombay, which do not have a starch plant of their own, should be given a separate quota for imports of maize in proportion to its capacity for the production of glucose. The firm should be free to get the maize imported by it processed by any starch factory. This arrangement should be tried for a period of one year at the end of which the position should be reviewed.
- (4) The industry should continue to strive for a further improvement in the quality of its product, particularly in reducing the protein content of their starch which is at present somewhat higher than that required for production of good quality glucose.



**REPORT ON THE CONTINUANCE OF PROTECTION  
TO THE GLUCOSE INDUSTRY**

The claim of the glucose industry to protection or assistance was first referred to the interim Tariff Board by the Government of India in the Department of Commerce by their Resolution No. 218-T(55)/45, dated 16th February, 1946. The Board, after conducting the necessary inquiries submitted its report to Government on 16th January, 1947. The following were the main recommendations:-

Origin of the  
case.

"(i) In the interest of the healthy development of the starch industry, it would be desirable to allow the starch factories to convert a maximum of 10 per cent. of their starch production into glucose, until the maize position becomes easier, when the matter should be re-considered and the restriction relaxed.

(ii) The revenue duty of 30 per cent. should be converted into a protective duty at the same rate and should remain in force till 31st March, 1950.

(iii) Glucose should be shown as a separate item in the Annual Statement of the Sea-borne Trade of India."

The Board did not recommend the application of Section 4(1) of the Indian Tariff Act, as it was not then possible to ascertain with any degree of accuracy either the cost of production of indigenous glucose or the landed cost of imported glucose. The Board considered that if there was a

phenomenal fall in the landed cost of imported glucose, it would be open to the glucose manufacturers to approach Government again for a review of the case. The Government of India in the Ministry of Commerce, by their Resolution No. 218-T(17)/47, dated 12th April, 1948, accepted these recommendations and protection was granted to the industry upto 31st March, 1950. The duration of the protective duty was extended from time to time, in consultation with the Tariff Board and later with the Tariff Commission, by the Indian Tariff (Second Amendment) Act of 1950; the Indian Tariff (Amendment) Act of 1952 and the Indian Tariff (Fourth Amendment) Act of 1952. The present period of extension expires on 31st December, 1953. In 1951, a surcharge of 5 per cent. was levied under the Finance Act of 1951 on revenue considerations and the duty was consequently enhanced to 31½ per cent. *ad valorem*. The present inquiry has been undertaken under Section 11(e) read with Sections 13 and 15, of the Tariff Commission Act under which the Commission has been empowered to inquire into and report on any further action required in relation to the protection granted to an industry, with a view to its increase, decrease, modification or abolition, according to the circumstances of the case.

2. On 24th December, 1952 the Commission issued questionnaires to producers, importers and consumers of glucose. A

list of those to whom questionnaires were issued  
 Method of inquiry. and from whom replies or memoranda were received

is given in Appendix I. On 19th January, 1953, the Commission issued a press communique inviting all persons and Associations interested in this inquiry to express their views on the question of continuance of protection or assistance to this industry. The industrial Adviser (Chemicals), Ministry of Commerce and Industry, Government of India, was requested to furnish the Commission with a detailed memorandum on the progress of the industry since the last inquiry, with particular reference to the rated capacity of the industry, its actual production, the

quality of its product and the import control policy. The Directors of Industries with the State Governments of Bombay, U.P., East Punjab, West Bengal and Madras were addressed for information on various points arising out of this inquiry. The Ministry of Food and Agriculture, Government of India, was consulted with regard to the supplies of maize available for the manufacture of starch, since starch is the principal material required for the manufacture of glucose. Information regarding the c.i.f. prices and landed costs of imported glucose was obtained from the Collectors of Customs. Shri B.N. Das Gupta, Member, visited the works of the Anil Starch products Ltd., Ahmedabad, on 7th February, 1953. Shri S.S.Mehta, Technical Adviser and Shri N. Krishnan, Cost Accounts Officer, visited the works of the Glucose & Foods Ltd., Kurla, on 14th January, 1953. They also visited the Anil Starch Products Ltd., at Ahmedabad on 28th and 29th January, 1953 and examined the cost of production of glucose at that factory. A public inquiry was held at the Commission's office in Bombay on 16th February, 1953. A list of persons who attended the inquiry and gave evidence is given in Appendix II.

3. Glucose is produced in two grades, commercial and medicinal. The commercial grade is sold in either liquid or solid form, both having a similar composition attained by partial conversion of starch, the only difference being the lower moisture content in the solid form. Commercial glucose is principally used in the manufacture of confectionery and food products like biscuits, preserved fruits, syrups and sweet drinks. It is also used in the textile, leather, cigarette and rayon industries. Crystalline glucose, which is also known as dextrose or glucose powder, is produced in a high degree of purity and by a more complete conversion of starch. It is used as infant food and in the pharmaceutical industry. The scope of the last inquiry was limited to liquid glucose only, as there was no indigenous production of crystalline glucose. Since then, a new unit, the Glucose

Scope of the  
inquiry.

and Foods, Ltd., has produced small quantities of crystalline glucose. The firm claims that it can manufacture crystalline glucose economically by making certain additions to its present plant at a cost of Rs. 1 lakh. According to a test report from the Haffkine Institute, Bombay, however, crystalline glucose produced by this firm, while conforming to all other B.P. specifications, does not comply with the limit for sulphated ash. We consider, therefore, that it is premature at this stage to include crystalline glucose in the scope of the inquiry. The scope is, therefore, limited to non-medicinal glucose.

4. Production of glucose was started in India on a commercial scale in 1944. The three companies which had plant and machinery for the manufacture of glucose at that time were the Anil Starch Products Ltd., Ahmedabad, the Rampur Maize Products Ltd., Rampur, and the Bharat Starch and Chemicals Ltd., Janna Nagar, East Punjab. All the three units are public limited companies. The Anil Starch Products have an authorised capital of Rs. 1 crore and a subscribed and paid-up capital of Rs. 10 lakhs. The Rampur Maize products have an authorised capital of Rs. 20 lakhs and a subscribed and paid-up capital of Rs. 12 lakhs. The Bharat Starch and Chemicals have an authorised capital of Rs. 20 lakhs and a subscribed and paid-up capital of Rs. 10 lakhs. These units are primarily starch manufacturing concerns. The Anil Starch Products, which have an annual capacity of 7,200 tons for production of starch, produced 3,044 tons and 2,154 tons of starch during 1951 and 1952 respectively. The annual capacity of the Rampur Maize Products is 4,800 tons of starch and their actual production of starch was 1,335 tons in 1952. The firm was out of production in 1951. The Bharat Starch and Chemicals have an annual capacity of 4,800 tons of starch and produced 1,442 tons and 1,413 tons of starch in 1951 and 1952 respectively. The annual rated capacity of these units for the production

of glucose is 2,100 tons each for the Anil Starch Products and the Rampur Maize Products, and 150 tons for the Bharat Starch and Chemicals. The Bharat Starch and Chemicals, however, have plans to put up a bigger plant with an annual capacity of 1,500 tons. Since 1951, a new unit, namely, Glucose and Foods Ltd., Kurla, Bombay, with an authorised capital of Rs. 15 lakhs and a subscribed and paid-up capital of Rs. 3.26 lakhs, has come into existence. It has installed a modern plant obtained from Czechoslovakia with a capacity of 1,000 tons of liquid glucose or 600 tons of crystal glucose per annum. The Government of Bombay have advanced Rs. 4 lakhs to this concern at compound interest of  $5\frac{1}{2}$  per cent per annum. The firm has no facilities for manufacturing starch. It is the only unit which has so far produced crystal glucose, but we understand that for production of crystal glucose on a large scale, it will have to instal some additional equipment for recovery of glucose from hydrol. The total rated capacity of the industry for the manufacture of non-medicinal glucose now comes to 5,350 tons per annum, as compared with 3,600 tons estimated by the Tariff Board in 1947. Owing to the non-availability of starch at an economic price and other difficulties, none of the units mentioned above has been able to utilise more than a small fraction of its capacity for the production of glucose. The maximum production of glucose by the domestic industry was only 364.4 tons in 1946. Details of production by the various units are given in paragraph 6 below. Since 1948 both the Rampur Maize Products and the Bharat Starch and Chemicals have been out of production. The Anil Starch Products also were producing glucose only intermittently, but have resumed regular production since November, 1952. The Glucose and Foods Ltd., have had difficulties in obtaining their requirements of starch at economic prices and have consequently been able to produce only 33 tons so far. We understand from the Industrial Adviser (Chemicals), Ministry of Commerce and Industry, Government of India, that

two new units, namely, the Hindustan Colour and Chemical Manufacturing Company, Kathwada, Bombay State, and the Kamla Sugar Mills, Gurukulam, Madras State, have plans for the manufacture of glucose.

5. The domestic demand for liquid glucose was estimated at the previous inquiry at 2,500 tons per annum for undivided Domestic India. This estimate was based on the imports of demand. glucose during the years immediately preceding the Second World War. On the present occasion, we have received estimates of annual demand for non-medicinal glucose varying from 2,500 tons to 3,500 tons. The Development Wing of the Ministry of Commerce and Industry, Government of India, has estimated the annual demand for liquid glucose at 3,500 tons and that for crystal glucose at 2,000 tons. The estimate for liquid glucose has been arrived at on the following basis. Liquid glucose is used in the manufacture of all good confectionery to the extent of 33 per cent of the weight of the finished product. The average production of confectionery in India during the last three years was about 11,000 tons per annum, of which 9,000 tons may be taken as the production of confectionery in the manufacture of which liquid glucose is used. On this basis, the demand for liquid glucose from the confectionery industry comes to 3,000 tons. The demand for glucose, whether in liquid or solid form, from other food industries and for pharmaceutical purposes may be taken as 500 tons and hence the total demand comes to 3,500 tons. This estimate was discussed at the public inquiry and was found generally acceptable. It will be seen from the figures given in paragraph 9 below that the actual imports of non-medicinal glucose in 1950-51 and 1951-52 were much higher than this estimate, amounting to 6,573 tons in 1950-51 and 13,392 tons in 1951-52. Imports of glucose, however, have been influenced by the variations in the import control policy and the consequent desire on the part of importers to build

up large stocks to provide against future restrictions. The import statistics given in paragraph 9 below, therefore, do not provide a reliable basis for estimating the domestic demand. We have, accordingly, adopted the estimate supplied by the Development Wing, namely, 3,500 tons per annum.

6. The following statement shows the production of glucose by the various factories since 1943:-  
Production.

(Statement on page 8)

It will be seen that the industry was able to produce only small quantities of glucose throughout the period of protection. Production of glucose became uneconomical, mainly because of the marked rise in the price of imported maize and the consequent increase in the cost of indigenous starch.

7. (a) The principal raw material required for the manufacture of glucose is pure starch with a strictly limited content of protein and soluble impurities. In addition, small quantities of hydrochloric acid or sulphuric acid, neutralising agents like soda ash or chalk and clarifying agents like activated carbon are also required. Of these materials, all except activated carbon are available in the country.

(b) The principal raw material, starch, is, however, produced from imported maize and the difficulties of the industry arise mainly from the high prices of this material. Maize is principally imported from the United States of America, where during the last few years, prices have risen so high as to make it difficult for the Indian starch industry to carry on production in competition with imported maize starch or sago flour. While the cost of maize to the factories rose from Rs. 313 per ton in 1949-50 to Rs. 534.4 per ton in 1951, i.e., by more than 70 per cent., the landed cost of maize starch rose from Rs. 39.76 per cwt. to Rs. 57.61

Sl. No.	Name of the Producer	Year of commencement	Annual rated capacity as furnished by the manufacturers (in tons)	Total Production (in tons)									
				1943	1944	1945	1946	1947	1948	1949	1950	1951	1952
1.	Anil Starch Products Ltd., Ahmedabad.	1943	2,100	12	159	53	66	58	27.0	77.40	219.15	156.00	72
2.	Bharat Starch & Chemicals Ltd., Jamma-nagar (Dist. Ambala).	1944	150	-	87.27	83.1	38.4	17.25	-	-	-	-	-
3.	Rampur Maize Products Ltd., Rampur (U.P.),	1944	2,100	-	-	190	280	281.20	-	-	-	-	-
4.	Glucose & Foods Ltd., Kurla, Bombay.	1951	1,000 tons Liquid or 800 tons Crystal	-	-	-	-	-	-	-	-	-	32.77
TOTAL			5,350	12	246.27	346.1	304.4	354.45	27.0	77.40	219.15	156.00	104.77



per cwt., i.e., by less than 45 per cent. Sago flour was throughout much cheaper than maize starch, the landed cost of the former (pink variety) being Rs. 39.45 per cwt. in 1951. In addition, there were heavy imports of all kinds of starch materials (including sago flour) in 1950-51 and 1951-52 and this also affected the sales of indigenous starch. Consequently, the indigenous starch industry has not been able to utilise more than a small proportion of its productive capacity ever since 1947, as may be seen from the figures given below:-

	1947	1948	1949	1950	1951	1952
1. Number of factories in production	7	7	4	5	11	11
2. Their rated capacity (in tons)	30,720	28,800	17,400	18,300	35,700	35,700
3. Their actual production (in tons)	1,350	3,650	3,600	910	8871.10	7883.42
4. Production as percentage of capacity	4.39	12.67	20.69	5	24.29	22.08

Recently, however, there has been a marked improvement in the outlook for the starch industry and the industry is hopeful of being able to achieve a substantial increase in production. The representative of the Textile Commissioner informed us at the public inquiry that the stocks of imported starch materials had declined and that the off-take of indigenous maize starch had increased to roughly 1,200 tons a month. In its 1951 report on the starch industry the Tariff Board had estimated the normal demand for starch other than sago flour, at 20,000 to 25,000 tons a year and there is, therefore, scope for a further increase in the demand for maize starch, if imports of other starch materials continue to be regulated as at present. The supply position of maize has also improved. In 1951, 14,100 tons of maize were imported by the members of the All India

Starch Manufacturers' Association from the U.S.A. and 2,454 tons by the Bharat Starch and Chemicals Ltd., Calcutta, from Burma; in 1952, the members of the Association imported 9,750 tons from the U.S.A. In the current year, however, an import licence for 20,000 tons of maize has been issued to the Association for the first quarter (January-March) and the members of the Association have already contracted to purchase about 10,000 tons against this licence. The Bharat Starch and Chemicals are expected to receive an additional licence. The c.i.f. price of American maize has fallen to Rs. 393 per ton, as compared with about Rs. 478 per ton in 1951 and 1952. The Ministry of Food and Agriculture, Government of India, have informed the Commission that while the internal availability of maize for the manufacture of starch and the question of earmarking for this purpose deteriorated foodgrains declared unfit for human or animal consumption are under examination, generally speaking it might be stated that it should not be difficult to supply adequate quantities of maize for this purpose either from internal production or imports.

(c) The annual requirements of starch for the production of non-medicinal glucose are estimated at about 3,500 tons. From the evidence received by us, it is clear that the domestic industry should be able to obtain this quantity from indigenous sources. We understand, however, that the starch factories are at present not allowed to convert more than 20 per cent. of the production of starch into glucose. This limit, which was only 10 per cent. prior to 1952, was imposed at a time when the domestic production of starch was insufficient to meet the requirements of the textile industry. The position has now changed, since the textile industry is now using cheaper substitutes like sago flour and tamarind kernel powder for a large proportion of its requirements and even if its off-take of maize exceeds the present rate of 1,200 tons a month, the demand for maize starch is not likely to be sufficient to utilise more than a small proportion of

the domestic capacity for the production of starch. Production of glucose will enable the domestic starch industry to utilise its capacity to a fuller extent and it is, therefore, necessary to provide adequate material for the production of glucose in order to ensure the development of the starch industry on a sound basis. We have discussed this question with the representative of Textile Commissioner and recommend that in lieu of the present arrangement under which the indigenous starch industry is allowed to utilise a portion of its starch production for the manufacture of glucose, those starch factories which have glucose plants should be given separate quotas for imports of maize exclusively for the manufacture of glucose. It is recognised that imports of maize involve expenditure of dollar exchange, but the bulk of the imports of liquid glucose also come from the United States and there is certainly some saving of foreign exchange in importing maize instead of glucose produced from the same material. The manufacturers should also experiment with tapioca as an alternative raw material and should from time to time report to the Commission the progress made by them in this direction. If tapioca is found suitable, it may become possible to curtail imports of maize and thus save foreign exchange.

(d) One of the units, namely Glucose and Foods Ltd., has no starch plant of its own and has consequently to purchase starch from outside. This firm has requested that it should be allowed to import its requirements of maize starch free of duty on the following grounds, namely, (1) that as a result of the domestic starch industry being linked with the textile industry, the starch produced by it, though suitable for the purposes of the textile industry, is not of the quality required for the production of glucose and consequently requires further processing, and (2) that the price of Rs. 52 per cwt. at which indigenous starch has been available is much higher than the landed cost of starch from Holland which is about Rs. 42 per cwt. and that this makes it uneconomical to produce glucose from indigenous

starch. The firm is agreeable to suitable arrangements being made to ensure that starch imported by it free of duty is actually utilised for the production of glucose. We have discussed this question with the representatives of both Glucose and Foods Ltd., and the All India Starch Manufacturers' Association. We consider that except for this unfortunate handicap, Glucose and Foods Ltd., are very well equipped for efficient manufacture of glucose and therefore, deserve assistance in securing their requirements of starch. We also recognise that dependence on other starch factories some of which are also engaged in the production of glucose, involves certain risks for this factory. However, starch is a protected industry and the main justification for encouraging the production of glucose is that it will help the starch industry to utilise its productive capacity more fully. It is, therefore, not desirable at this stage to allow foreign starch to be imported for the manufacture of glucose, whether with or without duty. The proposition that the high prices of indigenous starch make it difficult for the domestic glucose industry to meet foreign competition has been examined later in this Report, but this is a handicap which is common to all the units and will have to be dealt with by common remedies. The complaint that indigenous starch is not of suitable quality for the production of glucose would imply that glucose produced by units other than Glucose and Foods Ltd., is not of satisfactory quality. The evidence regarding the quality of indigenous glucose is given later in the report, from which it will be seen that the quality of indigenous glucose has improved since the last inquiry. The indigenous starch factories are also expected to continue their efforts to improve the quality of their starch. We appreciate, however, that the risks involved in Glucose and Foods Ltd., having to depend on other starch factories for their material should be minimised and we, therefore, recommend that this firm should be given a separate quota for imports of maize in proportion to its capacity for the production of glucose. The firm should be free to get the

maize imported by it processed by any starch factory. The Anil Starch Products have assured us that they are prepared to supply starch to Glucose and Foods Ltd., at a price fixed by the Commission, subject to adjustments for the price of maize, when maize is not supplied by Glucose and Foods Ltd., or to process the maize supplied by the latter at rates similarly fixed. We consider that these arrangements should be tried for a period of one year and that the position may then be reviewed.

8. (a) The evidence received at the previous inquiry had revealed that indigenous glucose possessed the following

Quality of the	defects namely, that it was cloudy in appear-
indigenous	ance, that it gave varying tints to the pro-
product.	ducts manufactured from it and that the same

output of confectionery was not obtained from the indigenous product as from the imported product. The producers had admitted the existence of some of these defects, but had explained them as due to the non-availability of good quality starch and activated carbon of special quality of which considerable shortage was experienced during war time. The Tariff Board was satisfied with this explanation and had expressed the hope that as the industry gained more experience and was able to obtain raw materials of proper quality, the indigenous product would come up to the standard of the imported product. On the present occasion, we have received the views of the Indian Confectionery Manufacturers' Association, Calcutta, individual confectionery and biscuit factories, the producers of glucose and Government departments, regarding the quality of indigenous glucose. The Indian Confectionery Manufacturers' Association has stated that the Confectionery Factories in India have been using only imported glucose, because indigenous glucose has not yet attained the requisite standard and is also priced higher than the imported product. The Deccan Sugar & Abkari Co. Ltd., Samalkot, the East India Distilleries and Sugar Factories Ltd., Nellikuppam and the Britannia Biscuit Co., Bombay, have reiterated the criticism

made on the previous occasion to the effect that the indigenous product is mere acidic in character and that, not being crystal clear, it is not suitable for use in the production of clear boiled sweets. The producers of glucose, on the other hand, have pointed out that they have now overcome their earlier difficulties and that the glucose syrup now produced by them is not merely water white in colour but compares favourably in all respects with the imported variety. They claim, further, that it conforms to the B.P. Specifications for glucose intended for use in medicines. The Development Wing of the Ministry of Commerce and Industry, Government of India, has had occasions to examine samples of liquid glucose produced by Anil Starch Products and Glucose and Foods, and has confirmed that both these units, which possess modern plant and suitable technical personnel, are capable of producing liquid glucose of standard quality. The Director of Industries, Bombay, has informed us that there has recently been some improvement in the locally manufactured glucose, though it has still not come up to the standard of the imported product.

(b) After a careful examination of the available evidence, we have come to the conclusion that while the quality of indigenous glucose has certainly improved since the last inquiry, the industry would have been able to show still greater improvement, had conditions been favourable for its regular working. Since indigenous glucose has not had a fair chance to compete with imported glucose, which has throughout been available at lower prices, the consumers have been using mostly imported glucose, consequently, the opinions expressed by them about the quality of indigenous glucose are not based on adequate data. We recommend that the indigenous industry should continue to strive for a further improvement in the quality of the product. In particular, the manufacturers should endeavour to reduce the protein content of their starch which is at present somewhat higher than what is required for production of

glucose of good quality. We recommend, further, that the Development Wing of the Ministry of Commerce and Industry should carry out periodical tests of the quality of indigenous glucose.

9. Imports of glucose are not shown separately in the Annual Statement of the Foreign Trade of India. Since September, 1949, however, the Director General of Imports.

Commercial Intelligence and Statistics has been maintaining a record of the quantity and value of imports of protected commodities not shown separately in the published accounts, and statistics of imports of medicinal and non-medicinal glucose are consequently available from September, 1949, and are given in the following statement:

(Statement on page 16)

Imports of non-medicinal glucose rose from 1,351 tons in the last seven months of 1949-50 to 6,573 tons in 1950-51 and to 13,393 tons in 1951-52. The marked increase in imports during 1951-52 was due to the liberal import policy followed during 1951. In 1952, imports of liquid glucose were restricted and consequently only 649 tons of non-medicinal glucose were imported during the first 8 months of 1952-53. The bulk of the imports came from the United States.

10. (a) The Cost Accounts Officer has examined the cost of production of glucose at the works of Anil Starch Products, the only unit which is at present

Fair ex-works  
price of glucose.

in production. In addition to starch and glucose, the Company also produces superphosphate, sulphuric acid, dextrine and fine chemicals. The Company has, however, not yet developed a proper system of costing and the allocations of expenditure between the various products are not made on a consistent or satisfactory basis. In view of this and the fact that prior to November, 1952, the factory was not in regular production for a long time, we have not been able to work out its actual costs. In consultation with the Technical Adviser, however, we have

IMPORTS OF GLUCOSE INTO INDIA

16

Origin of Import	1949-50 (September-March)		1950-51		1951-52		1952-53 (April-November)	
	Quantity (Tons)	Value (Rs.)	Quantity (Tons)	Value (Rs.)	Quantity (Tons)	Value (Rs.)	Quantity (Tons)	Value (Rs.)
Holland ...	a 19.80	14,392	2,258.55	12,09,851	-	-	-	-
	b 200.00	1,74,850	N.A.	2,58,395	-	-	-	-
U.K. ...	a -	-	388.1	3,07,897	74.25	96,212	25.15	41,713
	b 0.5	1,623	N.A.	80,065	60.90	1,95,456	15.65	45,773
U.S.A. ...	a 1,331.2	9,10,680	3,927.45	35,85,284	12,452.30	85,20,190	685.55	8,09,692
	b 737.1	7,05,558	496.85	15,82,445	365.20	3,49,493	279.90	2,81,704
France ...	a -	-	-	-	16.35	25,258	-	-
	b -	-	-	-	-	-	-	-
Poland ...	a -	-	-	-	389.25	2,83,397	-	-
	b -	-	-	-	-	-	-	-
Other countries	a -	-	1.25	1,690	260.4	2,38,968	-	12
	b 0.75	2,555	0.40	1,191	12.4	10,772	-	16
Total	a 1,351.00	9,25,072	6,573.35	50,84,904	13,392.55	91,64,025	648.70	8,50,417
	b 938.35	8,84,592	487.25	19,02,096	438.5	5,55,721	295.55	3,27,483
Total Glucose	2,289.35	18,09,664	7,040.60	69,87,000	13,831.05	97,19,746	944.25	11,77,910

Source: Monthly returns of imports of the protected commodities, furnished by the Director General of Commercial Intelligence & Statistics, Calcutta.

NOTE: (a) Glucose, other than glucose prepared for medicinal purposes, and  
(b) Glucose prepared for medicinal purposes.



prepared an estimate of costs, and this is submitted as a separate enclosure to this report, as the Company has requested us to keep the details of the estimate confidential.

(b) The most important element in the cost of production of glucose is the cost of starch which is manufactured by the Company itself. We have estimated the cost of starch on the basis adopted by the Tariff Board in 1951, after making suitable adjustments for the change in the price of maize. It has been assumed that only imported maize will be available to the Company in the near future and the cost of such maize has been taken as Rs. 433/- per ton at factory site, on the basis of the latest c.i.f. price of Rs. 393/- per ton plus Rs. 40/- per ton for packing and handling charges and railway freight from Bombay to Ahmedabad, as against Rs. 534/- per ton at factory site adopted by the Tariff Board in 1951. On this basis, the cost of wet starch works out to Rs. 1016.79 per ton. The maximum production of glucose attained by the Company in any year was only 219 tons. We consider, however, that given adequate protection and provided adequate supplies of maize are available, the the Company should be able to produce 1,500 tons of glucose and the cost of production has, therefore, been computed on this basis. The Company's working capital requirements are estimated at Rs. 5.5 lakhs, based on 3 months' stocks of glucose, about 6 months' stocks, of raw materials and miscellaneous stores (other than starch) and 4 months' stocks of drums required for packing, and interest on this amount has been allowed at  $4\frac{1}{2}$  per cent. per annum. The gross value of the block pertaining to glucose is estimated at Rs. 1.75 lakhs. Depreciation has been allowed at income tax rates on the written-down value of this block and return at 10 per cent on the original value. The fair ex-works price of liquid glucose computed on this basis comes to Rs. 1253.17 per ton or Rs. 62.66 per cwt.

11. Glucose other than glucose prepared for medicinal purposes is assessed to duty under Item 21(3) of the First Schedule to the Indian Customs Tariff. Glucose for medicinal purposes is assessed under Item No. 28, chemicals, drugs and medicines, all sorts, not otherwise specified, provided it is imported in packages of 1 lb. or less; otherwise, it is assessed under Item 21(3). The relevant extract from the Indian Customs Tariff (36th Issue) is given below:

Item No.	Name of the article	Nature of duty	Standard rate of duty	Preferential rate of duty if the article is the produce or manufacture of			Duration of protective rate of duty
				The United Kingdom.	A British Colony	Burma	
21(3)	Glucose other than glucose prepared for medicinal purposes.	Protective	31½% <i>ad valorem</i>	-	-	-	December 31, 1952
28	Chemicals, drugs and medicines, all sorts not otherwise specified.	Preferential revenue	Rate of duty actually charged at the time for such products of the United Kingdom or British colonial origin plus 10 per cent. <i>ad valorem</i> plus 5 per cent of the total duty.	28 per cent <i>ad val.</i> plus 5 per cent of the total duty.	28 per cent <i>ad val.</i> plus 5 per cent of the total duty.	10½ per cent <i>ad val.</i>	

12. A statement in Appendix III gives the c.i.f. prices and landed costs of liquid glucose as furnished by the c.i.f. Collectors of Customs and some of the principal price and importers in their replies to our questionnaire. landed cost. The lowest c.i.f. price of liquid glucose (Globe brand) imported in 1952 by Messrs. Corn Products (India) Ltd., a leading importer, from the U.S.A., which is the principal source of supply, was Rs. 41-4-5 per cwt. On the basis of this price, the landed cost of liquid glucose works out as follows:-

	Per Cwt.
	Rs. a. p.
C.i.f. price	41- 4 5
Customs duty @ 31½ per cent.	13 1 2
Clearing charges	1 2 7
Landed cost with duty	55 8 2
Landed Cost without duty	42 7 0

13. The following statement shows the rate of duty required to equate the fair ex-works price of indigenous glucose, as determined by us in paragraph 10, with the landed costs of imported glucose as given in paragraph 12.

Comparison of the fair ex-works price with the landed cost.

	Per Cwt.
	Rs. a. p.
(a) Fair ex-works price ...	52 10 7
(b) (i) c.i.f. price ...	41 4 5
(ii) clearing charges ...	1 2 7
(c) Landed cost without duty...	42 7 0
(d) Difference between fair ex-works cost and landed cost without duty [(a) - (c)] ...	20 3 7
(e) (d) as a percentage of c.i.f.	49 per cent.
(f) Existing duty ...	31½ per cent. ad valorem

14. It will be seen from the figures given in the preceding paragraph that a duty of 49 per cent. *ad valorem* is required to equate the landed cost of imported glucose with the fair ex-works price of indigenous glucose. The existing rate of duty is 31½ per cent. *ad valorem*. We have carefully considered whether the industry should continue to receive protection and if so, whether the protection should be granted by increasing the rate of import duty or in some other form. As stated earlier, the actual production of glucose in the country since the grant of protection has been very small in relation to domestic requirements. The two factories in Northern India have remained out of production for several years, while Anil Starch Products, who were also producing glucose only intermittently, have been in regular production only since November, 1952. Glucose and Foods, Ltd., Bombay, have produced only small quantities. It might appear that a protected industry which has failed to meet more than a small proportion of the domestic requirements should not receive further protection. In considering this question however, due regard must be paid to the various factors which were responsible for this state of affairs. The existing protective duty of 30 per cent. (excluding surcharge) was fixed in 1947 on the basis of an estimated cost of production of Rs. 44 per cwt. in the case of Anil Starch Products and Rs. 54/- per cwt. in the case of Rampur Maize Products and a landed cost, ex-duty, of about Rs. 43 per cwt. It will be seen from the statement given in Appendix III that during the last three years, the landed costs, ex-duty, of imported glucose ruled at or below Rs. 43 for long periods. On the other hand, there was a rise in the c.i.f. price of maize from Rs. 190 per ton in 1947 to Rs. 478 per ton in 1951 and 1952, i.e., by more than 150 per cent., resulting in a corresponding increase in the cost of production of indigenous starch and glucose. In these circumstances, it was well-nigh impossible for the domestic glucose industry to meet foreign competition at the existing rate of duty, and

it was, therefore, not surprising that two of the units had to stop production and that the other two units could not make much headway. The difficulties of the industry were further aggravated by the heavy imports of glucose which took place in 1951-52. Thus, the failure of the industry to maintain production hitherto was mainly due to the fact that the protection granted to it had become wholly inadequate. In the earlier stages, the industry also had difficulties in turning out a product which was acceptable to consumers. The leading units have now overcome this handicap by adopting an improved process of manufacture and have begun to produce glucose of superior quality. We think, therefore, that the mere fact that its actual production has been low should not be regarded as vitiating the claim of this industry to continuance of protection, but that the industry should be given a further chance to develop under a revised system of protection on the basis of the current cost of production. In our view, the reasons given by the Tariff Board in paragraph 14 of its 1947 Report regarding the desirability of developing the glucose industry still hold good. The development of derivatives like glucose, penicillin liquor etc. is essential to place the starch industry on a sound footing. It is only by developing new lines of production like glucose that the starch industry, which is already faced with a serious threat of substitutes, can safeguard its future. Efficient and well-equipped units like Anil Starch and Glucose & Foods have already put in considerable effort in developing the technique of manufacture and deserve every encouragement in carrying on this work. Glucose & Foods Ltd., have also received financial assistance from the Government of Bombay and have installed a modern plant for the manufacture of glucose. We have no doubt that discontinuance of protection at this stage will nullify the efforts which these units are making to establish this industry in the country in spite of difficult conditions. Besides, since the starch industry is already protected, the protection

claimed by the glucose industry is largely in the nature of compensation for the higher cost of starch which accounts for more than 80 per cent. of the total cost of production of glucose. Anil Starch Products and Bharat Starch and Chemicals have assured the Commission that should protection be continued to the glucose industry, and provided the industry is allowed to import adequate quantities of maize, they will endeavour to achieve a substantial increase in production, to maintain and improve the quality of their products and also to charge prices on the basis of the fair ex-works prices determined by the Commission. For these reasons, we consider that the industry should be allowed a further term of protection. As regards the form of protection, we have considered whether import control (which in any case exists on balance of payments grounds), combined with a mere continuance of the existing rate of import duty would be adequate to safeguard the position of the industry. The industry has suggested a modified form of import control under which importers and users of glucose will be required to produce evidence of having purchased a specified proportion of their requirements from indigenous producers as a condition for the grant of import licences. We are unable to accept this suggestion, since at the present stage of the development of this industry, it is likely to cause undue handicaps to consumers. Even if import control in the usual form is to be relied upon, we feel that a severe restriction of imports will not be fair to the confectionery and pharmaceutical industries, when the glucose industry has yet to achieve a rate of output which will meet a reasonable proportion of the domestic demand. We think, therefore, that import duties would be a more appropriate form of protection for this industry and would involve less hardships to consumers than import control. The rate of duty indicated in the preceding paragraph is 49 per cent. *ad valorem*. (The duty on confectionery, in the manufacture of which glucose syrup is principally used, is also high, namely, 62½ per cent. *ad valorem*). In order, however, to provide a small margin

for contingencies, we recommend that the rate of duty on glucose (other than glucose prepared for medicinal purposes) should be increased from the present level of 31½ per cent. *ad valorem* to 50 per cent. *ad valorem* (inclusive of surcharge) with immediate effect and that the enhanced rate should remain in force until 31st December, 1954. The entire position should be reviewed sometime before that date.

15. Our conclusions and recommendations may be summarised

Summary of as under:-

conclusions (1) The scope of the inquiry is limited to glucose  
and recom- other than glucose prepared for medicinal purposes.  
mendations. [ Paragraph 3 ]

(2) The rated capacity of the industry for the manufacture of non-medicinal glucose is 5,350 tons per annum. [Paragraph 4]

(3) The domestic demand for non-medicinal glucose is estimated at 3,500 tons per annum. [Paragraph 5]

(4) Actual production, however, has been very small, the maximum quantity produced so far being only 364.4 tons in 1946. Production in 1952 was only 105 tons. The industry was unable to meet foreign competition at the existing rate of protective duty, owing to a marked rise in the price of imported maize and the consequent increase in the cost of indigenous starch. [Paragraph 6]

(5) The present arrangement under which the indigenous starch industry is allowed to utilise a portion of its starch production for the manufacture of glucose should be terminated and those starch factories which have glucose plants should be given separate quotas for imports of maize exclusively for the manufacture of glucose. The manufacturers should experiment with tapioca as an alternative raw material and should from time to time report to the Commission the progress made by them in this direction. [Paragraph 7(c)]

(6) Glucose and Foods Ltd., Bombay, which do not have a starch plant of its own, should be given a separate quota for imports of maize in proportion to its capacity for the production of glucose. The firm should be free to get the maize imported by it processed by any starch factory. This arrangement should be tried for a period of one year at the end of which the position should be reviewed. [Paragraph 7(d)]

(7) While the quality of indigenous glucose has improved since the last inquiry, the industry would have been able to show still greater improvement had conditions been favourable for its regular working. The industry should continue to strive for a further improvement in the quality of its product. In particular, the manufacturers should endeavour to reduce the protein content of their starch which is at present somewhat higher than what is required for production of glucose of good quality. The Development Wing of the Ministry of Commerce and Industry should carry out periodical tests of the quality of indigenous glucose. [Paragraph 8 (b)]

(8) Since protection hitherto granted to the industry has proved wholly inadequate, and the industry has also improved the quality of its product by adopting a better process of manufacture, it should be given a further chance to develop under a revised system of protection on the basis of the current cost of its materials. The rate of protective duty on non-medicinal glucose should be increased from the present level of  $31\frac{1}{2}$  per cent. *ad valorem* to 50 per cent. *ad valorem* (inclusive of surcharge) and the enhanced rate should remain in force until 31st December, 1954. [Paragraph 14]

16. We wish to express our thanks to the representatives of producers, importers and consumers who furnished us with valuable information and tendered oral evidence before us. Our thanks are also due to Dr. S.R. Ramachandran, Deputy Director, Office of the Textile Commissioner, Bombay and to Shri

Acknowledge-  
ments.



V.A. Mehta, Assistant Development Officer, Ministry of Commerce and Industry (Development Wing), for their assistance in connection with this inquiry.

B.V. Narayanaswamy,  
*Member.*

B.N. Adarkar,  
*Member.*

B.N. Das Gupta,  
*Member.*

D.K. Malhotra,  
*Secretary*

Bombay

dated the 30th March, 1953.



# APPENDIX I

(Vide paragraph 2)

List of persons or bodies to whom the Commission's questionnaires were issued and from whom replies or memoranda were received.

\* Indicates those who have sent detailed replies to the questionnaire or sent memoranda.

## Producers:

- \* 1. The Anil Starch Products Ltd.,  
Post Box No. 93, Ahmedabad 2.
- \* 2. Bharat Starch & Chemicals Ltd.,  
5, Royal Exchange Place, Calcutta 1.
- \* 3. Glucose & Foods Ltd.,  
16, Bombay Agra Road, Kurla, Bombay.
- \* 4. Hindustan Colour Chemical Manufacturing Co. Ltd.,  
Post Kathwada, Naroda, Ahmedabad.
- 5. Kamla Sugar Mills Ltd.,  
Gurukulam Udamalpet, Coimbatore, Madras.
- \* 6. Rampur Maize Products, Ltd.,  
Rampur (U.P.).

## Importers:

- 1. Boots Pure Drug Co. (India) Ltd.,  
Post Box No. 680, Bombay 1.
- \* 2. Corn Products Co. (India) Ltd.,  
Post Box No. 994, Bombay 1.
- \* 3. Getz Bros. & Co.,  
Post Box No. 910, Bombay 1.
- 4. N. Jivanlal & Co., Ltd.,  
Princess Street, Bombay 2.
- 5. Nanavati & Co., Ltd.,  
Apollo Street, Bombay 1.
- 6. P.M. Hutheesing & Sons,  
Post Box No. 74, Ahmedabad.
- 7. Pioneer Trading Co.,  
Shri Krishna Niwas, Kalbadevi Road, Bombay 2.
- 8. Standard Chemical Co. Ltd.,  
281, Samuel Street, Vadgadi, Bombay 3.
- \* 9. The Sizing Materials Co. Ltd.,  
Post Box No. 15, Bombay 1.

## Consumers:

- \* 1. Britannia Biscuit Co. Ltd.,  
Reay Road, East Mazgaon, Bombay.
- \* 2. Bengal Chemical & Pharmaceutical Works,  
164, Maniktala Main Road, Calcutta 11.
- 3. Boots Pure Drug Co. (India) Ltd.,  
Asian Building, Nicol Road,  
Post Box No. 680, Ballard Estate, Bombay 1.
- 4. Calcutta Confectionery Works,  
666, Jerbai Wadia Road, Parel, Bombay 12.
- \* 5. Dr. D. Writer and Co.,  
Opposite Rangari Chawl, Bhawani Shanker Road,  
Dadar, Bombay 28.
- \* 6. Glaxo Laboratories (India) Ltd.,  
Worli, Bombay 18.
- \* 7. Haelley India Industries,  
Haelley and Co., Kakinada (East Godavari).
- \* 8. Hind Chemicals Ltd.,  
Post Box No. 227, Kanpur (U.P.).
- 9. J.B. Mangharam and Co.,  
12, Gunbow Street, Bombay 1.
- \* 10. National Rayon Corporation Limited,  
Ewart House, Bruce Street, Fort, Bombay.
- \* 11. National Confectionery Manufacturing Co.,  
263, Samuel Street,  
Vadgadi, Bombay 3.
- \* 12. Parry & Co. Ltd.,  
Post Box No. 12, Madras.
- 13. The Pharmaceutical and Allied Manufacturers' and  
Distributors' Association, Ltd.,  
Post Box No. 214, Fort, Bombay.
- \* 14. Parle Products Manufacturing Co. Ltd.,  
Thackersey House, Graham Road, Ballard Estate,  
Bombay.
- \* 15. Ravalgaon Sugar Farm Ltd.,  
Ravalgaon, Nasik, Bombay.

## Associations:

- \* 1. All India Starch Manufacturers' Association,  
12, Rampart Row, Fort, Bombay.
- 2. Association of British Chemical Manufacturers ,  
Janmabhumi Chambers, Fort, Bombay.

*Associations (Contd.)*

3. The Indian Chemical Manufacturers' Association,  
Srinivas House, Outram Road, Bombay.
4. The Indian Chemical Manufacturers' Association,  
23-B, Netaji Subhas Road, Calcutta.
- \* 5. The Mahratta Chamber of Commerce and Industries,  
Post Box No. 525, Poona 2.
6. All India Food Preservers' Association,  
18-A, Aurangzeb Road, New Delhi.
- \* 7. Indian Confectionery Manufacturers' Association,  
23-B, Netaji Subhas Road, Calcutta.
8. Ahmedabad Millowners' Association,  
Post Box No. 7, Ahmedabad.
9. Bengal Millowners' Association,  
2, Church Lane,  
Calcutta 1.
10. Federation of Baroda State Mills & Industries,  
Baroda.
11. Madhyabharat Millowners' Association,  
9, South Tukogang, Indore (M.B.).
12. The Millowners' Association,  
Post Box No. 95, Bombay 1.
13. Southern India Millowners' Association,  
Race Course, Coimbatore.
14. Upper India Chamber of Commerce,  
Post Box No. 63, Kanpur (U.P.).
15. Indian Paper Mills' Association,  
23-B, Netaji Subhas Road, Calcutta.
16. Indian Paper Makers' Association,  
Post Box No. 280, Calcutta.

*Government Departments:*

- \* 1. The Industrial Adviser (Chemicals),  
Ministry of Commerce & Industry,  
Development Wing - Food Industries Deptt.,  
Shahjahan Road, New Delhi.
- \* 2. The Secretary to the Government of India,  
Ministry of Food & Agriculture,  
Shahjahan Road, New Delhi.
- \* 3. The Director of Industries to the Govt. of Bombay,  
Old Custom House Yard, Fort, Bombay.
4. The Director of Industries to the Govt. of Madras,  
Madras.

*Government Depts. (Contd.)*

5. The Director of Industries to the Govt. of West Bengal, Calcutta.
6. The Director of Industries to the Govt. of Uttar Pradesh, Lucknow.
7. The Director of Industries to the Govt. of East Punjab, Simla 2.

*Miscellaneous:*

Federation of British Industries,  
Jannabhumi Chambers, Fort Street, Ballard Estate,  
Bombay 1.



**APPENDIX II**  
(Vide paragraph 2)

*List of persons who attended the Commission's public inquiry on Monday, the 16th February, 1953 and gave evidence*

*Name of the Representative      Representing      Name of the Firm*

**PRODUCERS:-**

- |    |                         |   |   |
|----|-------------------------|---|---|
| 1. | Shri Chinubhai Manibhai | " | The Anil Starch Products Ltd., Ahmedabad. |
| 2. | " J.M. Thaper           | " | Bharat Starch & Chemicals Ltd., Calcutta. |
| 3. | " G.J. Karandikar       | " | Glucose & Foods Ltd., Kurla, Bombay.      |

**IMPORTERS:-**

- |    |                        |   |  |
|----|------------------------|---|--|
| 4. | Shri B.B. Sardeshpande | } | " Corn Products Co., (India) Ltd., Bombay. |
| 5. | Mr. P.H. Brown         |   |  |
| 6. | " R.W.C. Whyte         |   |  |
| 7. | Shri H.B. Shanker      | " | The Sizing Materials Co. Ltd., Bombay.     |
|    |                        |   | Getz Bros. & Co., Bombay.                  |

**CONSUMERS:-**

- |     |                      |   |  |
|-----|----------------------|---|--|
| 8.  | Shri S.R. Javalgekar | " | Parry & Co. Ltd., Madras, & Parle Products Manufacturing Co. Ltd., Bombay. |
| 9.  | Mr. R.A. Haryott     | } | " Glaxo Laboratories (India) Ltd., Bombay.                                 |
| 10. | " Keith Roy          |   |  |
| 11. | Shri J.D. Writer     |   |  |
| 12. | " S.N. Gundu Rao     | " | Dr. D. Writer & Co., Bombay.   |
| 13. | Dr. M.D. Parekh      | " | Ravalgaon Sugar Farm Ltd., Ravalgaon.                                      |
|     |                      |   | National Rayon Corporation Ltd., Bombay.                                   |

## CONSUMERS (Contd.)

14. Shri Saroj Mohan Dutta Representing Bengal Chemical & Pharmaceutical Works Ltd., Calcutta 11.

## ASSOCIATIONS:-

15. Shri A.R. Bhat " Mahratta Chamber of Commerce & Industries, Poona 2.
16. " S.B. Sethi " All India Starch Manufacturers' Association, Bombay.
17. " S.R. Javalgekar " Indian Confc. Manufacturers' Association, Calcutta 1.

## GOVERNMENT OFFICIALS:-

18. Shri V.A. Mehta " Ministry of Commerce & Industry, (Development Wing - Food Industries Department) New Delhi.
19. Dr. S.R. Ramachandran, Dy. Director. " Textile Commissioner, Bombay.
20. Dr. M.R. Mandlekar, Dy. Director of Industries. सयमेव जयते " Director of Industries, Bombay.

## APPENDIX III

(Vide Paragraph 12)

## STATEMENT SHOWING THE BREAK-DOWN OF THE LANDED COSTS OF LIQUID GLUCOSE INTO C.I.F., CUSTOMS DUTY AND CLEARING CHARGES

Sl. No.	Source of Information	Origin of Import	Date of Imports	Type and specifications	C.I.F. Prices		Customs duty		Clearing charges		Landed cost		Selling prices		Remarks
					Rs. As. Ps.	Rs. As. Ps.	Rs. As. Ps.	Rs. As. Ps.	Rs. As. Ps.	Rs. As. Ps.	Rs. As. Ps.	Rs. As. Ps.	Rs. As. Ps.	Rs. As. Ps.	
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
(Per cent.)															
Corn Products Co. (India) Ltd., Bombay.															
		U.S.A.	Jan. 1960	Globe brand glucose 5A	26 6 1	11 6 2	0 13 4	38 9 7	75 0 0	● Selling prices are not based on cost of individual shipments but on overall costs keeping in view market conditions from time to time.					
		"	May 1960	"	35 5 8	10 11 5	2 9 11	48 11 0	80 0 0						
		Holland	June 1960	"	35 5 10	10 9 6	2 9 9	48 9 1	-						
		U.S.A.	Nov. 1960	"	38 14 0	11 12 6	2 13 9	53 8 3	-						
		U.S.A.	Dec. 1960	"	38 14 0	11 12 6	2 13 9	53 8 3	-						
Corn Products Co. (India) Ltd., Bombay.															
		U.S.A.	Jan. 1961	Globe brand glucose 5A	40 9 6	12 5 0	2 14 6	55 13 0	85 0 0						
		"	Feb. 1961	"	39 10 11	12 0 5	3 1 0	54 12 4	85 0 0						
		"	Feb. 1961	"	40 9 6	12 3 9	0 8 6	53 5 9	-						
		"	March 1961	"	41 0 3	13 0 10	2 15 0	57 0 1	-						
		"	March 1961	"	42 1 5	13 6 3	3 0 7	58 8 3	-						
		"	April 1961	"	41 0 3	12 14 1	0 8 10	54 7 2	-						
		"	May 1961	"	42 2 0	13 4 0	3 0 9	58 6 9	-						
		"	May 1961	"	41 12 6	13 2 9	3 0 1	57 15 4	-						
		"	May 1961	"	42 1 4	13 5 2	1 1 0	56 7 8	-						
		"	July 1961	"	42 10 8	13 2 8	3 0 0	58 13 4	-						
		"	Sept. 1961	"	42 10 8	13 4 6	0 6 0	56 5 2	48 0 0						
		"	Nov. 1961	"	-	-	-	-	80 0 0						
		"	Nov. 1961	"	-	-	-	-	85 0 0						



## APPENDIX III (Contd.)

1	2	3	4	5	6	7	8	9	10	11
	Collector of Customs, Madras.	U.S.A.	19-11-1961	450 Beams	42 15 0	31½%	-	-	-	
	The Sizing Materials Co. Ltd., Bombay.	U.S.A.	22-12-1961	45 Be. Cry- stal clear.	39 3 9	12 6 6	0 14 6	55 0	0*	0
	Corn Products Co. (India) Ltd., Bombay.	U.S.A.	March 1962	Globe brand glucose 5A.	41 4 6	13 1 2	1 2 7	55 8 2	-	
	"	"	Oct. 1962	"	-	-	-	-	70 0 0	
										<p>* Selling prices are not based on cost of individual shipments but on overall costs keeping in view market conditions from time to time.</p>
	Collector of Customs, Madras.	U.S.A.	25-1-62	Globe 5A liquid Lamb brand stallys liquid.	42 0 0	31½% a.v.	-	-	-	
	"	"	5-2-62	"	41 0 0	31½% a.v.	-	-	-	
	Collector of Customs, Bombay.	U.S.A.	6-3-62	"	40 0 8	31½% a.v.	-	-	-	
					(Rs. 35-12-0 per 100 lbs.)					
	Getz Bros. & Co., Bombay.	U.S.A.	Latest	"	43 8 0	31½% a.v.	3%	-	**	
					(£ 8.07 per 100 lbs.)				81 4 0	**
	Holland	"	"	"	43 8 0	31½%	3%	-	81 4 0	**
					(£ 65/- per long ton)				(ex-godown)	
										<p>** Rs. 43-8-0 has been approximately worked at the current exchange rate by the Company. The selling price includes 6½% town duty.</p>

# LIST OF REPORTS OF THE INDIAN TARIFF BOARD

## I. TARIFF INQUIRIES

### (A) NEW CASES

1. Sodium thiosulphate, sodium sulphite (anhydrous) and sodium bisulphite (1946).	PTB 158
2. Bichromates (1946).	PTB 157
3. Phosphates and phosphoric acid (1946).	PTB 156
4. Butter colour and aerated water powder colour (1946).	PTB 154
5. Calcium chloride (1946).	PTB 153
6. Coated abrasives (other than grinding wheels) (1946).	PTB 159
7. Hurricane lanterns (1946).	PTB 152
8. Cocoa powder and chocolate (1946).	PTB 155
9. Wood screws (1946).	PTB 97
10. Bicycles (1946).	PTB 100
11. Caustic soda and bleaching powder (1946).	PTB 88
12. Antimony (1946).	PTB 94
13. Sewing machines (1946).	PTB 101
14. Aluminium (1946).	PTB 90
15. Steel baling hoops (1946).	PTB 87
16. Preserved fruits (1946).	PTB 145
17. Non-ferrous metals (1946).	PTB 146
18. Cotton textile machinery (ring frames, spindles and spinning rings) (1947).	PTB 111
19. Rubber manufactures (1947).	PTB 110
20. Sodium and potassium metabisulphites (1947).	PTB 105
21. Alloy tool and special steel (1947).	PTB 118
22. Sodium sulphide (1947).	PTB 102
23. Electric motors (1947).	PTB 112
24. Dry battery (1947).	PTB 115
25. Plywood and teachests (1947).	PTB 113
26. Cotton and hair belting (1947).	PTB 121
27. Starch (1947).	PTB 103
28. Glucose (1947).	PTB 104
29. Chloroform, ether, sulphuric p.b. and anaesthetic and potassium permanganate (1947).	PTB 109
30. Fire hose (1947).	PTB 120
31. Steel belt lacing (1947).	PTB 119
32. Ferro-silicon (1947).	PTB 116
33. Oleic acid and stearic acid (1947).	PTB 117
34. Machine tools (1947).	PTB 114
35. Wire healds (1948).	PTB 123
36. Pickers (1948).	PTB 125

37. Motor vehicle batteries (1948).	PTB 122
38. Hydraulic brake fluid (1948).	PTB 129
39. Bobbins (1948).	PTB 128
40. Slate and slate pencils (1949).	PTB 138
41. Expanded metals (1949).	PTB 150
42. Cotton textile machinery (ring frames, spindles, spinning rings and plain looms) (1949).	PTB 167
43. Small tools (1949).	PTB 149
44. Plastics (1949).	PTB 160
45. Soda ash (1949).	PTB 165
46. Glass and glassware (1950).	PTB 174
47. Sterilised surgical catgut (1950).	PTB 184
48. Liver extract (1950).	PTB 185
49. Fountain pen ink (1950).	PTB 188
50. Pencils (1950).	PTB 187
51. Fine chemicals (1950).	PTB 182
52. Sago (1950).	PTB 186
53. Belt fasteners (1950).	PTB 189

## (B) REVIEW CASES

(Continuance of Protection)

1. Iron and steel manufactures (1947).	PTB 106
2. Paper and paper pulp (1947).	PTB 108
3. Cotton textile manufactures (1947).	PTB 98
4. Sugar (1947).	PTB 107
5. Magnesium chloride (1948).	PTB 124
6. Silver thread and wire (1948).	PTB 126
7. Bicycles (1949).	PTB 131
8. Artificial silk (1949).	PTB 132
9. Sericulture (1949).	PTB 133
10. Alloy tool and special steel (1949).	PTB 136
11. Sodium thiosulphate, sodium sulphite and sodium bisulphite (under section 4(1) of the Tariff Act) (1949).	PTB 140
12. Calcium chloride (1949).	PTB 148
13. Grinding wheels (under section 4(1) of the Tariff Act) (1949).	PTB 141
14. Hurricane lanterns (under section 4(1) of the Tariff Act) (1949).	PTB 144
15. Sugar (1949).	PTB 134
16. Preserved fruits (1949).	PTB 143
17. Coated abrasives (under section 4(1) of the Tariff Act) (1949).	PTB 147
18. Antimony (1949).	PTB 161
19. Phosphates and phosphoric acid (1949).	PTB 164

20. Starch (1949).	PTB 163
21. Bichromates (1949).	PTB 168
22. Ferro-silicon (1949).	PTB 169
23. Sewing machines (1949).	PTB 170
24. Cocoa powder and chocolate (1949).	PTB 172
25. Electric motors (1949).	PTB 166
26. Steel belt lacing (1949).	PTB 171
27. Cotton and hair belting (1949).	PTB 173
28. Calcium chloride (1950).	PTB 175
29. Sugar (1950).	PTB 179
30. Potassium permanganate (1950).	PTB 176
31. Wood screws (1950).	PTB 177
32. Dry battery (1950).	PTB 180
33. Oleic acid and stearic acid (1950).	PTB 178
34. Plywood and teachests (1950).	PTB 181

## II. PRICE REPORTS

1. Cotton yarn and cloth prices (1948).	PTB 127
2. Paper prices (1948).	PTB 130
3. Fair ex-works prices of superphosphate (1949).	PTB 139
4. Fair retention prices of steel produced by the Tata Iron & Steel Company and the Steel Corporation of Bengal (1949).	PTB 135
5. Ex-works costs of hot metal (Iron for steel making) and fair ex-works prices of pig iron (Basic and foundry grade) (1949).	PTB 137
6. Fair retention prices of steel produced by Mysore Iron & Steel Works, Bhadravati (1949).	PTB 151
7. Fair retention prices of steel produced by the Tata Iron & Steel Company and the Steel Corporation of Bengal (1951).	PTB 205

---

*All the above reports are available with the Manager of Publications, Civil Lines, Delhi, and the Secretary, Indian Tariff Board, Contractor Building, Nicol Road, Ballard Estate, Bombay I.*

